
launcher-menus

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Pradyumna Paranjape

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README

1.1 launcher_menus

1.1.1 Gist

Source Code Repository



Repository

Badges

1.1.2 Description

Launcher menu wrapper.

Provides an API for launcher menus such as:

- [dmenu](#)
- [bemenu](#)

Can be extended to other menus: see section [configuration](#)

What does it do

- Runs a subprocess for the selected `<menu>` and returns its standard output or `None`

INSTALLATION

2.1 Prerequisites

At least one of the following menu launchers need to be installed

- `dmenu`
- `bemenu`

Else, a *custom* menu may be used by supplying flags as described

2.2 Install

2.2.1 pip

Preferred method

Install

```
pip install launcher_menus
```

Update

```
pip install -U launcher_menus
```

Uninstall

```
pip uninstall -y launcher_menus
```

2.2.2 pspman

(Linux only)

For automated management: updates, etc

Install

```
pspman -s -i https://github.com/pradyparanjpe/launcher_menus.git
```

Update

```
pspman
```

That's all.

Uninstall

Remove installation:

```
pspman -s -d launcher_menus
```


USER-CONFIGURATION

Configuration file is in `yaml` format.

`<menu>.yaml` files bear flags corresponding to actions for `<menu>`, where `<menu>` may be `dmenu`, `bemenu`, etc

Any file named `_template.yaml` is ignored.

3.1 Location of configuration files

3.1.1 Default:

`<installation path>/site-packages/launcher_menus/menu-cfgs`

Custom configuration may be specified at the following locations:

3.1.2 User (XDG_CONFIG_HOME):

This variable is generally set to `$HOME/.config` on unix-like systems. Even if unset, we will still try the `$HOME/.config` directory.

`$XDG_CONFIG_HOME/launcher_menus/<menu>.yaml`

3.1.3 Local:

`^^.launcher_menus/<menu>.yaml**`

Note:

- Configuration is loaded in the same order as described above.
-

Warning:

- A later loaded configuration **SHALL** overwrite a previously loaded configuration if defined for the same `<menu>`.

3.2 Configuration format

Copy `_template` to `menu-cfgs/<menu>.yaml`

Edit fields to provide flags:

- Example:

```
bottom: -b
prompt: --prompt
```

3.2.1 Example:

`_template.yaml`

```
bool:
  bottom: null
  grab: null
  wrap: null
  ifne: null
  ignorecase: null
  nooverlap: null

input:
  version: null
  lines: null
  monitor: null
  height: null
  prompt: null
  prefix: null
  index: null
  scrollbar: null
  font: null
  title_background: null
  title_foreground: null
  normal_background: null
  normal_foreground: null
  filter_background: null
  filter_foreground: null
  high_background: null
  high_foreground: null
  scroll_background: null
  scroll_foreground: null
  selected_background: null
  selected_foreground: null
  windowid: null
```

4.1 Instructions

4.1.1 Call <menu>

Call menu [dmenu, bmenu, <others>] from python script as a replacement for input popups.

Basic usage

- Import in script:

```
# import
from launcher_menus import menu

user_letter = menu(command='bmenu', opts=['a', 'b', 'c', 'd'])
if user_letter is not None:
    # user did not hit <Esc>
    print(user_letter)
else:
    print("Aborted...")
```

Results:

a

Fancy usage

- User-defined styles

```
# import
from launcher_menus import LauncherMenu

mask_color = "#000000"
password_menu = LauncherMenu(command='bmenu', filter_background=mask_color,
                              filter_foreground=mask_color)
password = password_menu()
if password is None:
    # user hit <Esc>
    print("Can't go ahead without password")
else:
    print(password) # A bad idea
```

Results:

```
Can't go ahead without password
```

- Pre-defined themes

```
# import
from launcher_menus.themes import emergency_prompt, password_prompt
```

4.2 Recommendation

- Use user-defined configurations

SOURCE CODE DOC

5.1 Entry Point

5.1.1 Package import

launcher_menus

Python API for Launcher menus

```
class launcher_menus.LauncherMenu (opts=None, command=None, flag_names=None,  
                                     fail='warn', **kwargs)
```

Launcher Menu wrapper object with pre-defined menu options.

Parameters

- **opts** (Optional[List[str]]) – list: options to be offered by menu.
- **command** (Optional[str]) – command to use {dmenu,bemenu,<custom>}
- **flag_names** (Union[PathLike, dict, None]) – dict providing action: flags or path to cognate yaml.
- **fail** (str) – ‘warn’: warn, ‘fail’: error, ‘guess’: try creating, else warn
- ****kwargs** – default values for kwargs of menu

opts

default options to be offered

command

default menu command to run

flag_names

dictionary of {actions: flag_names}

fail

default failure behaviour

Raises

- **TypeError** –
- **FlagNameNotFoundError** –

```
menu (opts=None, command=None, flag_names=None, fail='warn', **kwargs)
```

Call menu

Return type Optional[str]

exception `launcher_menus.MenuError`
<MENU> errors Base.

menu() call

`launcher_menus.LauncherMenu.__call__(self, opts=None, command=None, flag_names=None, fail='warn', **kwargs)`
Call <command> menu to collect interactive information.

Parameters

- **opts** (Optional[List[str]]) – list: options to be offered by menu.
- **command** (Optional[str]) – command to use {dmenu,bemenu,<custom>}
- **flag_names** (Union[PathLike, dict, None]) – dict providing action: flags or path to cognate yaml.
- **fail** (str) – ‘warn’: warn, ‘fail’: error, ‘guess’: try creating, else warn
- **kwargs** – flag to be called at command line:
 - `bottom = bool`: show bar at bottom
 - `grab = bool`: show menu before reading stdin (faster)
 - `ignorecase = bool`: match items ignoring case
 - `wrap = bool`: wrap cursor selection
 - `ifne = bool`: display only if opts
 - `nooverlap = bool`: do not overlap panels
 - `lines = int`: list opts on vertical ‘lines’
 - `monitor = int`: show menu on (bemenu w/ wayland: -1: all)
 - `height = int`: height of each menu line
 - `index = int`: select index automatically
 - `prompt = str`: prompt string of menu
 - `prefix = str`: prefix added highlighted item
 - `scrollbar = str`: display scrollbar {none,always,autohide}
 - `font = str`: font to be used format: “FONT-NAME [SIZE]”
 - `title_background = str`: title background color
 - `title_foreground = str`: title foreground color
 - `normal_background = str`: normal background color
 - `normal_foreground = str`: normal foreground color
 - `filter_background = str`: filter background color
 - `filter_foreground = str`: filter foreground color
 - `high_background = str`: highlight background color
 - `high_foreground = str`: highlight foreground color
 - `scroll_background = str`: scrollbar background color

- `scroll_foreground = str`: scrollbar foreground color
- `selected_background = str`: selected background color
- `selected_foreground = str`: selected foreground color
- `windowid = str`: embed into windowid

Raises

- ***CommandError*** –
- ***UsageError*** –
- ***FlagNameNotFoundError*** –
- **ValueError** – bad scrollbar options

Return type Optional[str]**Returns** User's selected opt from `opts` or overridden-entered choice else None [Esc]

5.2 Errors

5.2.1 Error/Warnings

Menu errors

exception `launcher_menus.errors.CommandError (args, err)`
 <MENU> command failed.

Parameters

- **args** (list) – args called with <menu> command.
- **err** (str) – error raised by <menu> command.

exception `launcher_menus.errors.FlagNameNotFoundError (command, flag)`
 Flag not found for <menu> in menu-cfgs/<menu>.yaml, nor provided via `**flags` or `config_yaml`.

Parameters

- **command** (str) – command that was used as <menu>.
- **flag** (str) – flag that was not identified from yaml file.

exception `launcher_menus.errors.MenuError`
 <MENU> errors Base.

exception `launcher_menus.errors.UsageError (args, err)`
 Usage error described by <menu> command.

Parameters

- **args** (list) – args called with <menu> command.
- **err** (str) – error raised by <menu> command.

5.3 Structure

5.3.1 Themes

Launcher Menu Themes

`launcher_menus.themes.custom_themes` (*custom_config=None*)

Read configuration file `themes.yml` from standard configuration locations and generate custom themes

Return type `Dict[str, LauncherMenu]`

`launcher_menus.themes.emergency_prompt` = `<launcher_menus.functions.LauncherMenu object>`

Emergency prompt menu

`launcher_menus.themes.menu` = `<launcher_menus.functions.LauncherMenu object>`

Plain menu object.

command defaults to the first one found to be installed.

`launcher_menus.themes.password_prompt` = `<launcher_menus.functions.LauncherMenu object>`

Password prompt menu.

TODO

- Configure `rofi`
- Configure `wofi`: Is it dead?
- Write launcher-menu in python and integrate.
- Configure others as issues arise
- If Configuration is not found, try to create a flag using standard posix and action keywords.

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